FIG.1

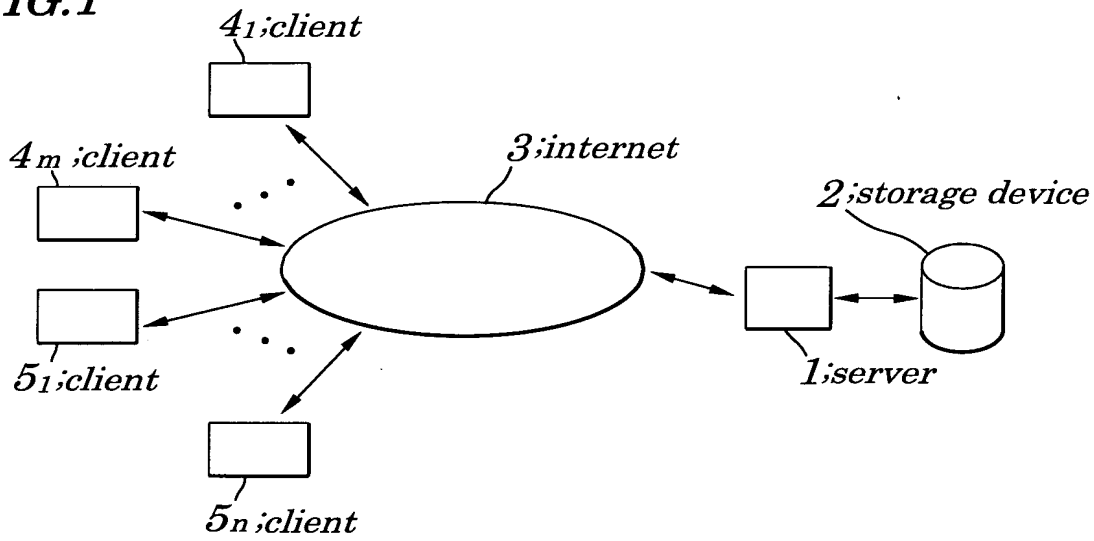

FIG.2

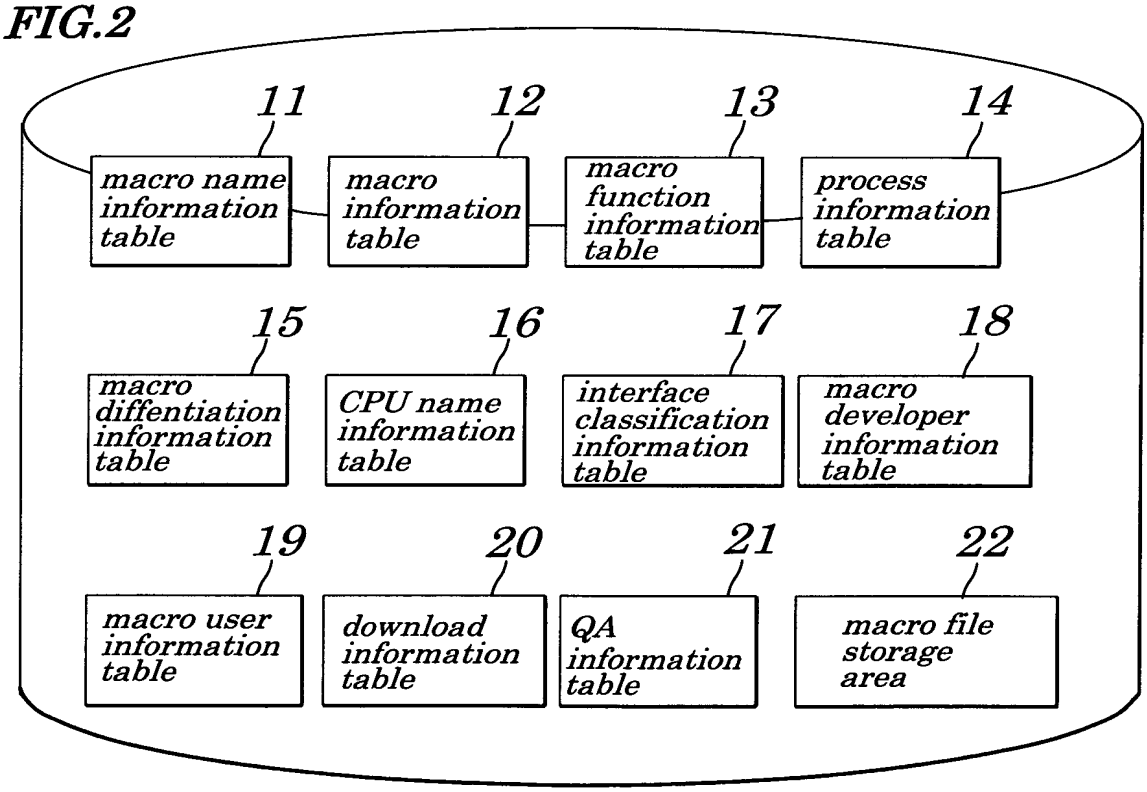

FIG.3

11

title	variable identifier	type	remark
macro code	MacroCode	INT	
macro name	MacroName	TEXT	
developer name	MacroDeveloperName	TEXT	

FIG.4

12:macro information table

title	variable identifier	type	remark
macro code	MacroCode	INT	
developer name	MacroDeveloperName	TEXT	
process code	ProcessCode	INT	
file name	FileName	TEXT	
macro call name(Japanese)	MacroCallNameJ	TEXT	
macro call name(English)	MacroCallNameE	TEXT	
macro differentiation	MacroDifferentiation	INT	0=cell base soft macro 1=cell base hard macro 2=manual hard macro
macro function code	MacroFunctionCode	INT	
CPU name code	CPUNameCode	INT	
I/F classification code	InterfacClassificationCode	INT	
function outline(Japanese)	FunctionOutlineJ	TEXT	
function outline(English)	FunctionOutlineE	TEXT	
items of attention and restriction(Japanese)	AttentionRestrictionItemJ	TEXT	
items of attention and restriction(English)	AttentionRestrictionItemE	TEXT	
related macros	RelationMacro	TEXT	list of parent macro names
planned release year	ReleasePlanDateY	INT	
planned release month	ReleasePlanDateM	INT	
planned release date	ReleasePlanDateD	INT	
present version	Version	TEXT	
data updating year	DataUpdateDateY	INT	
data updating month	DataUpdateDateM	INT	
data updating date	DataUpdateDateD	INT	
class of quality	QualityClass	INT	0=general assurance level 1=non-operational condition level 2=operational condition level 3=non-assured level 4=yet-to-be-completed level
size X	SizeX	TEXT	
size Y	SizeY	TEXT	
count of Al wiring layers	AlLayerCount	INT	
count of grids	GridCount	INT	
count of cells	CellCount	INT	
count of Tr	TrCount	INT	
action frequency	ActionFrequency	TEXT	
detection rate	MalfunctionDetectionRate	TEXT	
related QA numbers	RelationQANumber	INT	
memory capacity	MemoryCapacity	TEXT	
width of memory bus	MemoryBusWidth	TEXT	
access speed to memory	MemoryAccessSpeed	TEXT	
registered year	RegistrationDateY	INT	
registered month	RegistrationDateM	INT	
registered date	RegistrationDateD	INT	
final renewal year	FinalRenewalDateY	INT	
final renewal month	FinalRenewalDateM	INT	
final renewal date	FinalRenewalDateD	INT	
security level	security level	INT	0:All macro users can browse. 1:Only macro users having concluded a special contract can browse.

FIG.5

13;macro function information table

title	*variable identifier*	*type*	*remark*
macro function code	*MacroFunctionCode*	*INT*	
macro function name (in Japanese)	*MacroFunctionNameJ*	*TEXT*	
macro function name (in English)	*MacroFunctionNameE*	*TEXT*	

FIG.6

14;process information table

title	*variable identifier*	*type*	*remark*
process code	*ProcessCode*	*INT*	
process name	*ProcessName*	*TEXT*	

FIG.7

15;macro differentiation information table

title	*variable identifier*	*type*	*remark*
macro differentiation	*MacroDifferentiation*	*INT*	
name of macro differentiation (in English)	*MacroDifferentiationNameE*	*TEXT*	
name of macro differentiation(in Japanese)	*MacroDifferentiationNameJ*	*TEXT*	

FIG.8

16;CPU name information table

title	*variable identifier*	*type*	*remark*
code of CPU name	*CPUNameCode*	*INT*	
CPU name	*CPUName*	*TEXT*	

FIG.9

17;interface classification information table

title	*variable identifier*	*type*	*remark*
I/F classification code	*InterfaceClassificationCode*	*INT*	
I/F classification name	*InterfaceClassificationName*	*TEXT*	

FIG.10

18;macro developer information table

title	*variable identifier*	*type*	*remark*
macro developer ID	*MacrodeveloperID*	*INT*	
macro developer name	*MacroDeveloperName*	*TEXT*	
password	*Password*	*TEXT*	
name (Japanese)	*NameJ*	*TEXT*	
name(English)	*NameE*	*TEXT*	
organization(Japanese)	*OrganizationJ*	*TEXT*	
organization(English)	*OrganizationE*	*TEXT*	
post mail address	*PMail*	*TEXT*	
telephone	*Telnet*	*TEXT*	
E-mail address	*EMail*	*TEXT*	

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FIG. 11

19: macro user information table

title	variable identifier	type	remark
name of product developer	ProductionDeveloperName	TEXT	
password	Password	TEXT	
macro user name	Name	TEXT	
organization	Organization	TEXT	
post mail address	PMail	TEXT	
telephone number	Telnet	TEXT	
E-mail address	EMail	TEXT	macros
downloadable macro	DownloadableMacro	TEXT	list of macro for which application has been submitted
access level	AccessLevel	INT	0=Macro user is allowed to browse only outlines of macro. 1=Macro user is allowed to browse outlines and details of macro. 2=Macro user is allowed to download macro.

FIG. 12

20: download information table

title	variable identifier	type	remark
download right request ID	DownloadRequestID	INT	
user name	UserName	TEXT	
requesting year	RequestDateY	INT	
requesting month	RequestDateM	INT	
requesting date	RequestDateD	INT	
macro name	MacroName	TEXT	
process code	ProcessCode	INT	
download scheduling year	DownloadDateY	INT	
download scheduling month	DownloadDateM	INT	
download scheduling date	DownloadDateD	INT	
action flag	ActionFlag	INT	0=not yet processed 5=already processed 6=rejected

FIG. 13

21;QA information table

title	variable identifier	type	remark
QA code	QACode	INT	
macro code	MacroCode	INT	
process code	ProcessCode	INT	
version	Version	TEXT	
problem occurring year	ProblemDateY	INT	
problem occurring month	ProblemDateM	INT	
problem occurring date	ProblemDateD	INT	
contact year	ContactDateY	INT	
contact month	ContactDateM	INT	
contact date	ContactDateD	INT	
contact hour	ContactTimeH	INT	
contact minute	ContactTimeM	INT	
requested finish year	FinishRequestDateY	INT	
requested finish month	FinishRequestDateM	INT	
requested finish date	FinishRequestDateD	INT	
organization of users	ContactorOrganization	TEXT	
post mail of users	ContactorPMail	TEXT	
telephone number of users	ContactorTelnet	TEXT	
name of users	ContactorName	TEXT	
E-mail address of users	ContactorEMail	TEXT	
contents	Contents	TEXT	
status flag	StatusFlag	INT	0=Question is asked,but no reply has been made. 1=Final reply has been made.
final report plan year	FinalReportPlanDateY	INT	
final report plan month	FinalReportPlanDateM	INT	
final report plan date	FinalReportPlanDateD	INT	
final report year	FinalReportDateY	INT	
final report month	FinalReportDateM	INT	
final report date	FinalReportDateD	INT	
answer plan flag	AnswerPlanFlag	INT	0=No plan to make reply. 1=Plan to make reply.
importance flag	ImportantFlag	INT	0=Malfunction and bug. 1=General motification.

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FIG.14

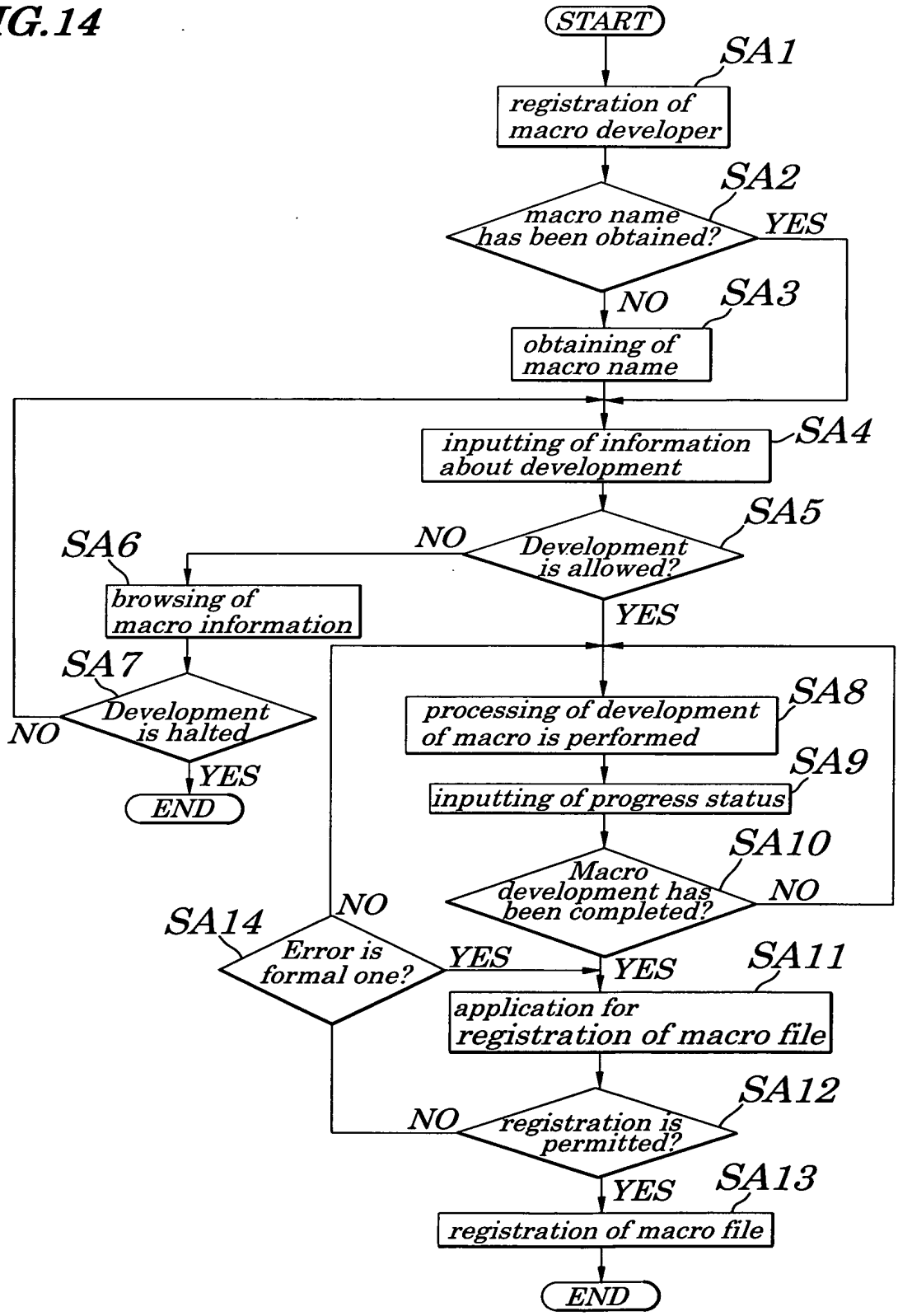
START
SA1
registration of macro developer
SA2
macro name has been obtained?
YES
NO
SA3
obtaining of macro name
inputting of information about development
SA4
SA5
Development is allowed?
NO
SA6
browsing of macro information
YES
SA7
Development is halted
NO
YES
END
SA8
processing of development of macro is performed
SA9
inputting of progress status
SA10
Macro development has been completed?
NO
YES
SA14
Error is formal one?
NO
YES
SA11
application for registration of macro file
SA12
registration is permitted?
NO
YES
SA13
registration of macro file
END

FIG.15

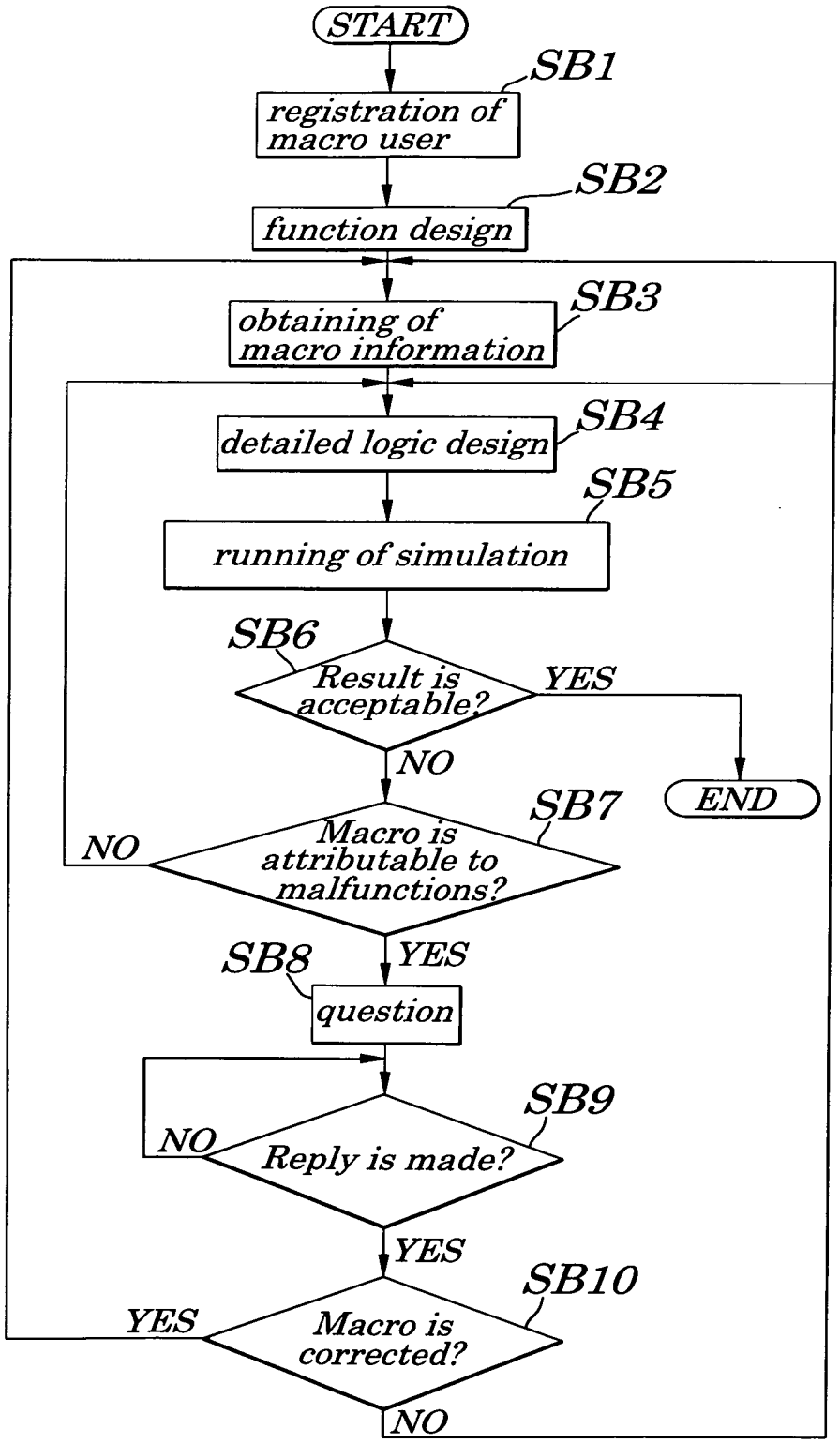
START
SB1
registration of macro user
SB2
function design
SB3
obtaining of macro information
SB4
detailed logic design
SB5
running of simulation
SB6
Result is acceptable?
YES
NO
END
SB7
Macro is attributable to malfunctions?
NO
YES
SB8
question
SB9
Reply is made?
NO
YES
SB10
Macro is corrected?
YES
NO

FIG.16

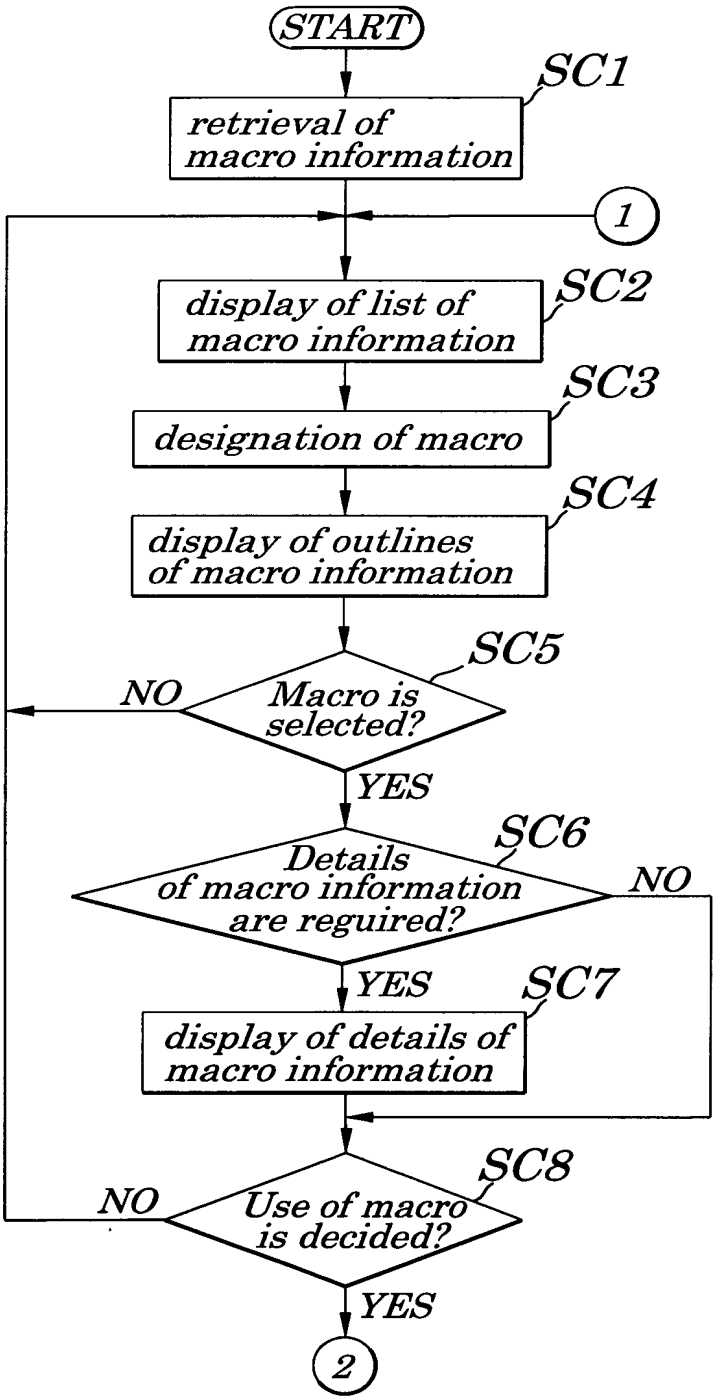
START
SC1
retrieval of macro information
1
SC2
display of list of macro information
SC3
designation of macro
SC4
display of outlines of macro information
SC5
Macro is selected?
NO
YES
SC6
Details of macro information are reguired?
NO
YES
SC7
display of details of macro information
SC8
Use of macro is decided?
NO
YES
2

FIG.17

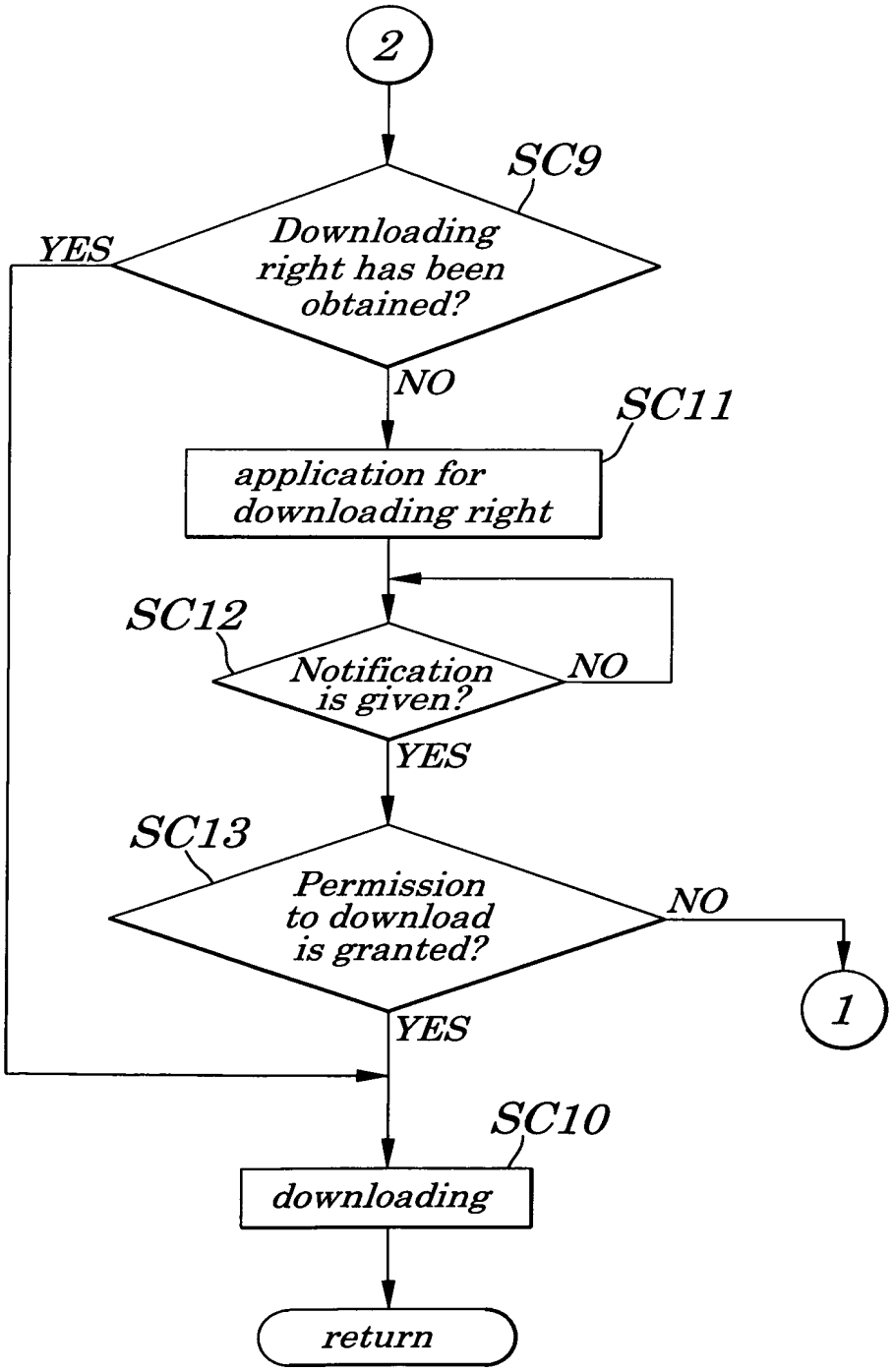

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FIG.18

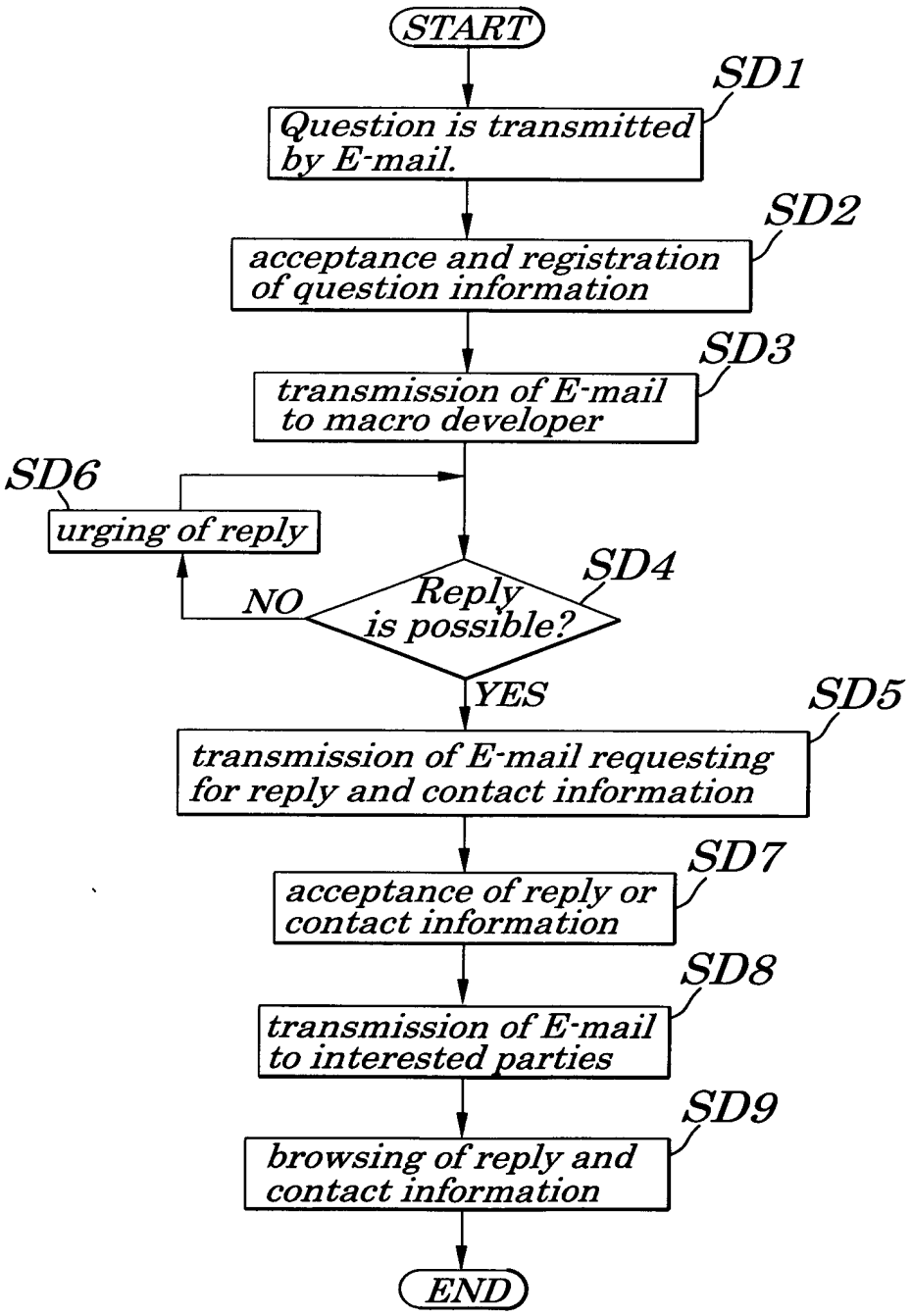
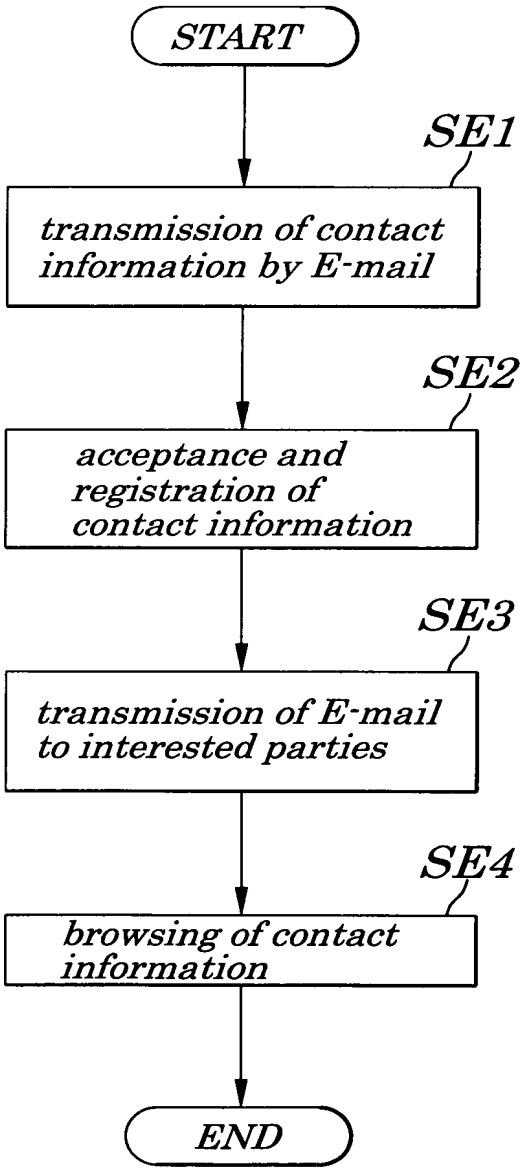

START
SD1
Question is transmitted by E-mail.
SD2
acceptance and registration of question information
SD3
transmission of E-mail to macro developer
SD6
urging of reply
NO
SD4
Reply is possible?
YES
SD5
transmission of E-mail requesting for reply and contact information
SD7
acceptance of reply or contact information
SD8
transmission of E-mail to interested parties
SD9
browsing of reply and contact information
END

FIG.19


START
SE1
transmission of contact information by E-mail
SE2
acceptance and registration of contact information
SE3
transmission of E-mail to interested parties
SE4
browsing of contact information
END